Roll No. | | | | | | | | | | | | | **Total No. of Pages : 02**

Total No. of Questions : 16

BCA (2019 Batch) (Sem.–2)

COMPUTER SYSTEM ARCHITECTURE

Subject Code : UGCA-1908

M.Code : 77416

Time : 3 Hrs. **Max. Marks : 60**

INSTRUCTIONS TO CANDIDATES :

1. **SECTION-A is COMPULSORY consisting of TEN questions carrying TWO marks each.**
2. **SECTION-B contains SIX questions carrying TEN marks each and students have to attempt any FOUR questions.**

SECTION-A

Write briefly :

1. Define NAND gate.
2. What is meant by Boolean expression?
3. What is SOP form?
4. List two benefits of K-maps.
5. What is meant by half adder?
6. Name two uses of multiplexer.
7. Define Flip Flop.
8. What is RISC?
9. What is meant by micro-operation?
10. Comment on Common bus system.

SECTION-B

11. Generate AND, OR and NOT gates using NAND gates.

12. a) Discuss the working of Full Adder Circuit.

    b) What is meant by encoder? Explain.

13. What is meant by JK Flip Flop? Explain the race-around condition in detail.

14. Explain the Von Neumann Architecture.

15. a) What are memory reference instructions? Explain.

    b) Explain the working of T-Flip Flop.

16 Draw and explain the working of 16 bit common bus system.

NOTE : Disclosure of Identity by writing Mobile No. or Making of passing request on any page of Answer Sheet will lead to UMC against the Student.